

<211> 882  
 <212> DNA  
 <213> Bacillus subtilis

<220>  
 <221> CDS  
 <222> (1)..(879)

<400> 21  
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 Met Ser Ile Ala Val Ser Glu Glu Glu Ala Lys Ala Val Glu Gly Leu  
 1 5 10 15

aat gat tat cta tct gtt gaa gaa gtg gag acg atc tat att ccg ctt 96  
 Asn Asp Tyr Leu Ser Val Glu Glu Val Glu Thr Ile Tyr Ile Pro Leu  
 20 25 30

gtt cgc ttg ctt cat tta cat gtc aag tct gcg gct gaa cgc aat aag 144  
 Val Arg Leu Leu His Leu His Val Lys Ser Ala Ala Glu Arg Asn Lys  
 35 40 45

cat gtc aat gtt ttt ttg aag cac cca cat tca gcc aaa att ccg ttt 192  
 His Val Asn Val Phe Leu Lys His Pro His Ser Ala Lys Ile Pro Phe  
 50 55 60

att atc ggc att gcc ggc agt gtc gca gtc gga aaa agc acg acg gcg 240  
 Ile Ile Gly Ile Ala Gly Ser Val Ala Val Gly Lys Ser Thr Thr Ala  
 65 70 75 80

cgg atc ttg cag aag ctg ctt tcg cgt ttg cct gac cgt cca aaa gtg 288  
 Arg Ile Leu Gln Lys Leu Leu Ser Arg Leu Pro Asp Arg Pro Lys Val  
 85 90 95

agc ctt atc acg aca gat ggt ttt tta ttt cct act gcc gag ctg aaa 336  
 Ser Leu Ile Thr Thr Asp Gly Phe Leu Phe Pro Thr Ala Glu Leu Lys  
 100 105 110

aag aaa aat atg atg tca aga aaa gga ttt cct gaa agc tat gat gta 384  
 Lys Lys Asn Met Met Ser Arg Lys Gly Phe Pro Glu Ser Tyr Asp Val  
 115 120 125

aag gcg ctg ctc gaa ttt ttg aat gac tta aaa tca gga aag gac agc 432  
 Lys Ala Leu Leu Glu Phe Leu Asn Asp Leu Lys Ser Gly Lys Asp Ser  
 130 135 140

gta aag gcc ccg gtg tat tcc cat cta acc tat gac cgc gag gaa ggt 480  
 Val Lys Ala Pro Val Tyr Ser His Leu Thr Tyr Asp Arg Glu Glu Gly  
 145 150 155 160

gtg ttc gag gtt gta gaa cag gcg gat att gtg att att gaa ggc att 528  
 Val Phe Glu Val Val Glu Gln Ala Asp Ile Val Ile Ile Glu Gly Ile  
 165 170 175

aat gtt ctt cag tcg ccc acc ttg gag gat gac cgg gaa aac ccg cgt 576  
 Asn Val Leu Gln Ser Pro Thr Leu Glu Asp Asp Arg Glu Asn Pro Arg  
 180 185 190

att ttt gtt tcc gat ttc ttt gat ttt tcg att tat gtg gat gcg gag 624  
 Ile Phe Val Ser Asp Phe Phe Asp Phe Ser Ile Tyr Val Asp Ala Glu  
 195 200 205

F03030 "G952960"

gaa agc cgg att ttc act tgg tat tta gag cgt ttt cgc ctg ctt cgg 672  
 Glu Ser Arg Ile Phe Thr Trp Tyr Leu Glu Arg Phe Arg Leu Leu Arg  
 210 215 220

gaa aca gct ttt caa aat cct gat tca tat ttt cat aaa ttt aaa gac 720  
 Glu Thr Ala Phe Gln Asn Pro Asp Ser Tyr Phe His Lys Phe Lys Asp  
 225 230 235 240

ttg tcc gat cag gag gct gac gag atg gca gcc tcg att tgg gag agt 768  
 Leu Ser Asp Gln Glu Ala Asp Glu Met Ala Ala Ser Ile Trp Glu Ser  
 245 250 255

gtc aac cgg ccg aat tta tat gaa aat att ttg cca act aaa ttc agg 816  
 Val Asn Arg Pro Asn Leu Tyr Glu Asn Ile Leu Pro Thr Lys Phe Arg  
 260 265 270

tca gat ctc att ttg cgt aag gga gac ggg cat aag gtc gag gaa gtg 864  
 Ser Asp Leu Ile Leu Arg Lys Gly Asp Gly His Lys Val Glu Glu Val  
 275 280 285

ttg gta agg agg gta tga 882  
 Leu Val Arg Arg Val  
 290

<210> 22  
 <211> 846  
 <212> DNA  
 <213> Bacillus subtilis

<220>  
 <221> CDS  
 <222> (1)..(843)

<400> 22  
 gtg gaa gga ttg aat gat tat cta tct gtt gaa gaa gtg gag acg atc 48  
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 1 5 10 15

tat att ccg ctt gtt cgc ttg ctt cat tta cat gtc aag tct gcg gct 96  
 Tyr Ile Pro Leu Val Arg Leu Leu His Leu His Val Lys Ser Ala Ala  
 20 25 30

gaa cgc aat aag cat gtc aat gtt ttt ttg aag cac cca cat tca gcc 144  
 Glu Arg Asn Lys His Val Asn Val Phe Leu Lys His Pro His Ser Ala  
 35 40 45

aaa att ccg ttt att atc ggc att gcc ggc agt gtc gca gtc gga aaa 192  
 Lys Ile Pro Phe Ile Ile Gly Ile Ala Gly Ser Val Ala Val Gly Lys  
 50 55 60

agc acg acg gcg ccg atc ttg cag aag ctg ctt tcg cgt ttg cct gac 240  
 Ser Thr Thr Ala Arg Ile Leu Gln Lys Leu Leu Ser Arg Leu Pro Asp  
 65 70 75 80

cgt cca aaa gtg agc ctt atc acg aca gat ggt ttt tta ttt cct act 288  
 Arg Pro Lys Val Ser Leu Ile Thr Thr Asp Gly Phe Leu Phe Pro Thr  
 85 90 95

gcc gag ctg aaa aag aaa aat atg atg tca aga aaa gga ttt cct gaa 336  
 Ala Glu Leu Lys Lys Lys Asn Met Met Ser Arg Lys Gly Phe Pro Glu

05667569-080884

100	105	110	
agc tat gat gta aag gcg ctg ctc gaa ttt ttg aat gac tta aaa tca			384
Ser Tyr Asp Val Lys Ala Leu Leu Glu Phe Leu Asn Asp Leu Lys Ser			
115	120	125	
gga aag gac agc gta aag gcc ccg gtg tat tcc cat cta acc tat gac			432
Gly Lys Asp Ser Val Lys Ala Pro Val Tyr Ser His Leu Thr Tyr Asp			
130	135	140	
cgc gag gaa ggt gtg ttc gag gtt gta gaa cag gcg gat att gtg att			480
Arg Glu Glu Gly Val Phe Glu Val Val Glu Gln Ala Asp Ile Val Ile			
145	150	155	160
att gaa ggc att aat gtt ctt cag tcg ccc acc ttg gag gat gac cgg			528
Ile Glu Gly Ile Asn Val Leu Gln Ser Pro Thr Leu Glu Asp Asp Arg			
165	170	175	
gaa aac ccg cgt att ttt gtt tcc gat ttc ttt gat ttt tcg att tat			576
Glu Asn Pro Arg Ile Phe Val Ser Asp Phe Phe Asp Phe Ser Ile Tyr			
180	185	190	
gtg gat gcg gag gaa agc cgg att ttc act tgg tat tta gag cgt ttt			624
Val Asp Ala Glu Glu Ser Arg Ile Phe Thr Trp Tyr Leu Glu Arg Phe			
195	200	205	
cgc ctg ctt cgg gaa aca gct ttt caa aat cct gat tca tat ttt cat			672
Arg Leu Leu Arg Glu Thr Ala Phe Gln Asn Pro Asp Ser Tyr Phe His			
210	215	220	
aaa ttt aaa gac ttg tcc gat cag gag gct gac gag atg gca gcc tcg			720
Lys Phe Lys Asp Leu Ser Asp Gln Glu Ala Asp Glu Met Ala Ala Ser			
225	230	235	240
att tgg gag agt gtc aac cgg ccg aat tta tat gaa aat att ttg cca			768
Ile Trp Glu Ser Val Asn Arg Pro Asn Leu Tyr Glu Asn Ile Leu Pro			
245	250	255	
act aaa ttc agg tca gat ctc att ttg cgt aag gga gac ggg cat aag			816
Thr Lys Phe Arg Ser Asp Leu Ile Leu Arg Lys Gly Asp Gly His Lys			
260	265	270	
gtc gag gaa gtg ttg gta agg agg gta tga			846
Val Glu Glu Val Leu Val Arg Arg Val			
275	280		

&lt;210&gt; 23

&lt;211&gt; 831

&lt;212&gt; DNA

&lt;213&gt; Bacillus subtilis

&lt;220&gt;

&lt;221&gt; CDS

&lt;222&gt; (1)..(831)

&lt;400&gt; 23

atg aaa aca aaa ctg gat ttt cta aaa atg aag gag tct gaa gaa ccg	48
Met Lys Thr Lys Leu Asp Phe Leu Lys Met Lys Glu Ser Glu Glu Pro	
1	5
	10
	15

T080800"69529960